REMARKS

In the Office Action of May 17, 2005 the Examiner rejected claims 1-13 under 35 USC 102(b) as being anticipated by Petersen et al. (5,630,417). Applicants respectfully traverse this rejection.

It should be noted that Petersen et al. discloses a rocker switch having a pair of magnets to be used with a single Hall effect sensor. The Petersen et al. arrangement, therefore, requires an adjustment mechanism to define a neutral switch position. The claimed invention, on the other hand, utilizes a single magnet in conjunction with a single Hall effect sensor in an arrangement which does not require any other "adjustment" components to define a neutral position. The neutral position of the claimed invention is inherently defined by the position at which the rocker switch comes to rest by virtue of the counter-balancing forces produced by the springs at each end of the rocker.

Petersen et al. does not disclose or suggest a pivotable rocker which selectively varies the distance between a single magnet and a single associated Hall effect sensor. Consequently, claims 1 and 2 are patentably distinguishable from this reference.

With regard to dependent claim 8, it should be noted that while Petersen et al. does disclose springs, it does not disclose dome springs. While it is true that dome springs are well known, and indeed Applicants have disclosed a dome spring as part of the prior art in Figure 1, the use of dome springs in the embodiment of the invention of claim 1 provides tactile and audible feedback (specification at page 7, line 23 to page 8, line 1) in a combination which is not disclosed by Petersen et al. It should also be noted that claim 8 is dependent on claim 1 and should be patentable therewith.

5

The Examiner also rejected claims 1-20 under 35 USC §103(a) as being unpatentable over Wolff (4,025,930) in view of Tamura (2004/0212344). Tamura simply discloses that a Hall-effect sensor could be used to sense the presence or absence of a device on a docking station (see Tamura paragraph 0058) and states that the Hall-effect sensor could be replaced by a reed switch. Therefore, the function of this sensor/switch in Tamura is to produce an on/off type signal. However, the reed switch used in Wolff is used to electrically connect a power source to a motor to activate the motor in one direction or the other (column 5, line 57 to column 8, line 7). Neither Wolff nor Tamura disclose or suggest that reed switches operate with a magnet that must be situated in a neutral position and moved closer to or farther away from the reed switches to produce varying voltage signals. Therefore, it would not occur to one of ordinary skill in the art to use the Hall-effect sensor of Tamura in place of the reed switches of Wolff. The claimed invention enables one pair of elements, an associated magnet/Hall sensor pair, to control at least three different functions by virtue of producing different signals depending on whether the spacing of the pair elements is closer, farther or neutral (at some point in between). In the Wolff device a pair of elements comprising a magnet and an associated reed switch is only able to close a circuit or, at most, produce two signals, on or off. In view of the above, Applicants respectfully submit the claimed invention is patentable over Wolff and Tamura.

With regard to claim 2, the Examiner indicates that Wolff discloses a neutral position. Applicants respectfully disagree. Wolff discloses the use of magnets with reed switches, the latter inherently being an only-on or only-off element. Even in a pivotable rocker type switch as Wolff shows in Figure 2, the operation of the Wolff circuit is completely different than that of the claimed invention. Each associated pair of

6

magnets and reed switches of Wolff can control only one function in on/off manner. That is, magnet 30 and switch 34 (Wolff Figure 2), when situated in a neutral position of rocker type switch 29 result in the contacts of switch 34 being open. Similarly, in the neutral position, magnet 31 and associated switch 36 at the other end of the rocker are spaced far enough apart so that the contacts of switch 36 are open. When forward portion 33 of switch 29 is depressed, the contacts of switch 34 are closed but the contacts of switch 36 still remain open and unaffected by the motion of forward end 33 because the magnet 31 associated with switch 36 moves further away from switch 36. Consequently, when the forward end 33 of switch 29 is depressed, the rear end controls nothing. This operation is contrary to that of the claimed invention in which moving a magnet relative to an associated Hall-effect sensor will control a function both as the magnet moves closer to the sensor and as it moves further away.

With respect to claim 8, it should be noted that Wolff does not disclose any dome springs and because claim 8 is dependent on claim 1 it should be patentable therewith.

With respect to claims 15-17, it should be noted that for the foregoing reasons Wolff does not disclose or suggest a switch having a biased neutral position for each pair of associated magnets and switches. That is, the associated magnet and switch at the front end of rocker switch 29 is either on or off and moving the magnet further away from the switch does not produce any function and, therefore, there can be no "neutral" position of the front end of the switch. It should be noted that the "neutral" position as used in Wolff refers to the position of the rocker type switch where the magnets at each end of the switch are spaced from the associated switches so as to have no effect on the switches. The term "neutral" as used in the claimed invention

7

refers to a switch position in which "neutral" is defined as the intermediate position of an end of the switch in between a minimum and maximum spacing of the magnet relative to the Hall-effect sensor associated with that magnet.

None of the prior art cited by the Examiner is deemed any more relevant than the prior art discussed above.

In view of the above, Applicants respectfully submit the claims are allowable over the prior art.